

# **FEDERAL GRANT OPPORTUNITIES**

*updated 10/16/09*

*\*new opportunities or changes highlighted\**

## **Open grants & deadlines:**

- **FY 2009 Global Climate Change Mitigation Incentive Fund (GCCMIF)**
- **Federal Loan Guarantees for Projects that Employ Innovative Energy Efficiency, Renewable Energy, & Advanced Transmission & Distribution Technologies** *(September 14, 2009-August 24, 2010; November 13, 2009-December 31, 2010)*
- **Federal Loan Guarantees for Electric Power Transmission Infrastructure Investment Projects** *(September 14, October 26, 2009—January 25, 2010)*
- **Emerging Frontiers in Research & Innovation 2010** *(October 9, November 13, March 31, 2010)*
- **Fall 2009 EPA Science to Achieve Results (STAR) Fellowships for Graduate Environmental Study** *(October 22)*
- **Smart Grid Investment Grant Program** *(October 23, November 4; February 10, March 3)*
- **Small Business Technology Transfer Program Phase I Solicitation FY 2010** *(November 17)*
- **Annual Phase I Small Business Innovation Research (SBIR) Small Business Technology Transfer (STTR)** *(November 20, 2009)*
- **Support of Advanced Coal Research at U.S. Colleges & Universities** *(November 24, 2009)*
- **Workforce Training for the Electric Power Sector** *(November 30, 2009)*
- **CHE-DMR-DMS Solar Energy Initiative** *(December 8, 2009; March 10, 2010)*
- **Smart Way Clean Diesel Finance Program FY 2009/2010 RFP** *(December 8, 2009)*
- **Clean Diesel Emerging Technology Funding Assistance Program, FY 2009/2010 RFP** *(December 8, 2009)*

- **National Clean Diesel Funding Assistance Program FY 2009/2010 RFP** *(December 8, 2009)*
- **7<sup>th</sup> Annual P3 Awards: A National Student Design Competition for Sustainability Focusing on People, Prosperity, & the Planet** *(January 4, 2010)*

## **FY 2009 Global Climate Change Mitigation Incentive Fund (GCCMIF)**

- Applications due: Rolling basis
- Visit <http://www.eda.gov/> for additional information and for any programming changes
- GCCMIF established to strengthen the link between economic development and environmental quality
- GCCMIF finances projects that foster economic development by advancing the green economy in distressed communities
- Applications are competitive, based on the Economic Development Association's standard eligibility and distress criteria, investment policy guidelines, and funding priority considerations
- Projects must achieve the same job and capital investment outcomes as traditional EDA investments
- Project must be one of the following:
  - Renewable energy (wind, solar, biomass, and geothermal)
  - Energy efficiency
  - Reuse/Recycling/Restoration (reuse of a given product or production of a new or innovative product for recyclable materials; also includes ecosystem restoration)
  - Green building (new construction or renovation certified by USGBC in LEED or comparable certificate program)
- Must result with outputs:
  - Development and/or manufacture of green end-product that furthers or contributes to sustainability and/or environmental quality (activity, item, plan, or program)
  - Greening of an existing function or process (investments that result in green enhancements to the resource, energy, water, and/or waste efficiency of an existing function or process)
  - Creation or renovation of a green building

## **ARRA - Federal Loan Guarantees for Projects that Employ Innovative Energy Efficiency, Renewable Energy, & Advanced Transmission & Distribution Technologies**

Funding Opportunity Announcement (FOA) # DE-FOA-0000140

- Application due dates:
  - Parts I & II submission dates depend on rounds
  - Part I: September 14, 2009 – August 24, 2010
  - Part II: November 13, 2009 – December 31, 2010
- Submission of applications for loan guarantees under Title XVII of the Energy Policy Act of 2005 in support of debt financing for projects in the U.S. that employ energy efficiency, renewable energy, and advanced transmission and distribution technologies that constitute new or significantly improved technologies that are not a commercial technology
- DOE will make up to \$8.5 billion in loan guarantee authority available
- Despite the due dates, the solicitation will remain open until the aggregate \$8.5 billion in loan guarantee authority is fully obligated
- Visit <http://www.fedconnect.net/> to view the full FOA, and consult <http://www.energy.gov/>, <http://www.whitehouse.gov/omb/> or <http://www.recovery.gov/> for additional information
- Only 3 categories of projects that begin construction no later than 9/30/11 are eligible under Section 1705 of Title XVII and may have their credit subsidy costs covered by appropriated funds under the Recovery Act
  1. Renewable energy systems, including incremental hydropower, that generate electricity or thermal energy and facilities that manufacture related components
  2. Electric power transmission system projects, including upgrading projects
  3. Leading edge biofuel projects that will use technologies performing at the pilot or demonstration scale that the Secretary determines are likely to become commercial technologies and will produce transportation fuels that substantially reduce life-cycle greenhouse gas emissions compared to other transportation fuels
- Eligible projects in categories listed below and which fall within 1 of the 2 distinct project types described:
  1. Alternative fuel vehicles
  2. Biomass
  3. Efficient electricity transmission, distribution, and storage
  4. Energy efficient building technologies and applications
  5. Geothermal
  6. Hydrogen and fuel cell technologies
  7. Energy efficiency projects
  8. Solar
  9. Wind & hydropower

- Technology categories for 1705 eligible projects are limited to renewable energy systems projects, electric power transmission systems projects, and leading edge biofuels projects
- Per DOE, eligible projects under categories 1, 4, 6, & 7 generally do not constitute 1705 eligible projects for which the credit subsidy costs may be paid for out of funds appropriated under the Recovery Act to pay for the costs of loan guarantee issued under the Section 1705 program
- Project types: manufacturing or stand-alone; see FOA for list of primary goals and objectives for these project types

## **ARRA – Federal Loan Guarantees for Electric Power Transmission Infrastructure Investment Projects**

FOA # DE-FOA-0000132

- Submission due dates:
  - Part I: September 14, 2009
  - 1<sup>st</sup> Round Part II: October 26, 2009
  - 2<sup>nd</sup> Round Part II: December 10, 2009
  - 3<sup>rd</sup> Round Part III: January 25, 2010
- Purpose: Submission of applications for loan guarantees from U.S. Department of Energy under Section 1705 of Title XVII of the Energy Policy Act of 2005 in support of debt financing for transmission infrastructure investment projects in the U.S.
- ARRA provides that \$5,965,000,000 in appropriated funds be made available until expended to pay credit subsidy costs of loan guarantees issued under Section 1705 of Title XVII for certain renewable energy systems, electric transmission systems, and leading edge biofuels projects
- Eligible projects
  - Shall consist of a complex electric transmission systems project located in U.S. that utilizes a commercial technology; is reasonably likely, at the time of the submission of the Part I application, to commence construction on/before 9/30/11
  - Project cannot be financed from private sources on standard commercial terms
  - Project must meet at least one of the following criteria:
    - Involves new or upgraded lines of at least 100 mi. of 500 kilovolts or higher or 150 mi. of 345 kV
    - Project has at least 30 mi. of transmission cable under water
    - Project has high voltage direct current (DC) component
    - Project is a major interregional connector
    - Project designated as a National Interest Electrical Transmission Corridor by DOE under EPOA of 2005
    - Project is associated with offshore generation
    - Project mitigates a substantial reliability risk for a major population center
    - A set of improvements to an integrated system within a state or region that together aggregate to meet criteria
  - Please see FOA for additional requirements and for information on eligible lenders

## **Emerging Frontiers in Research & Innovation (EFRI) 2010**

- Letter of intent due October 9, 2009
- Preliminary proposal due November 13, 2009
- Full proposal due March 31, 2010
- Information webcast on September 17, 2009 at <http://www.nsf.gov/eng/efri/>
- See <http://www.nsf.gov/pubs/2009/nsf09606/nsf09606.pdf>
- \$29 million expected to be available in FY 2010, pending the availability of funds
  - Each team may receive up to \$500,000 per year up to 4 years, pending availability
  - 14, 4-year awards expected
- Cost sharing not required
- Eligibility: U.S. academic institutions which perform research and with degree-granting educational programs in disciplines normally supported by NSF; these organizations are eligible to be the lead organization
  - Applicants are encouraged to form synergistic collaborations with government labs, industrial researchers, and scientists and engineers at foreign organizations where appropriate
- Program seeks proposals with potentially transformative ideas that represent an opportunity for a significant shift in fundamental engineering knowledge with a strong potential for long-term impact on national needs or a grant challenge
- *Renewable Energy Storage (RESTOR)*
  - Fundamental experimental and theoretical research needed to develop a transformative understanding of transport and reaction mechanisms and to uncover the underlying principles that govern the complex and interrelated mechanisms of electron and ion transfers, material decomposition, and energy conversion processes for large scale storage
  - 5 elements to be addressed:
    - R1: Cost effectiveness and technical feasibility of a large scale (10 MW minimum) energy storage capability of a solar and/or wind energy conversion site
    - R2: Identification of key existing barriers in achieving goals in R1
    - R3: Multidisciplinary approaches needed to overcome the barriers identified in R2 in order to achieve the goals in R1, including alternative/contingency plans when the main proposed approaches fail. Interdisciplinary synergies in the form of well-integrated systems approach to research are vital.
    - R4: Outcomes and impacts the proposed work will have on the EFRI topic as well as other applications
    - R5: Potential impact of the proposed work to address major societal needs, to revolutionize the area of large scale energy storage/generation, as well as to improve U.S. competitiveness in the global economy through advanced technology development

- *Science in Energy & Environmental Design (SEED): Engineering Sustainable Buildings*
  - Engage engineers, architects, and physical, biological, and social scientists to develop fundamental concepts to create the breakthrough innovations in building materials, models, and theories that will lay the foundation for the next generation of advanced sustainable building systems
  - Breakthrough research needed in: Materials and Sensing, Modeling and Simulation, and Concepts for Anatomy and Interdependence
  - Required SEED Elements:
    - S1: Define a unifying intellectual focus for synergistic innovation involving interdisciplinary research on the EFRI SEED topic or their integration
    - S2: Provide a unique framework through which components of diverse disciplines can connect and relate to each other
    - S3: Address the need for interdisciplinary research
    - S4: Address the anticipated research outcome and questions on how the resulting new discoveries will provide answers to problems leading to transformative science for next generation sustainable buildings
    - S5: Identify new motivations, new instruments and tools, and new validation vehicles for advanced sustainable vehicles



## **Fall 2009 EPA Science to Achieve Results (STAR) Fellowships for Graduate Environmental Study**

FON (Funding Opportunity Number) # EPA-F2009-STARI1 (Green Engineering/Building/Chemistry/Materials)

- Application due by October 22, 2009
- This is a U.S. Environmental Protection Agency (EPA) program that offers graduate fellowships for master's & doctoral level students in environmental fields of study
- See <http://www.grants.gov/> or [http://www.epa.gov/ncer/rfa/2009/2009\\_star\\_gradfellow.html](http://www.epa.gov/ncer/rfa/2009/2009_star_gradfellow.html) for additional information
- \$4.5 million expected to be available for all awards
- 120 expected awards at \$37,000 per year per fellowship
- Cost share not required
- Master's level – 2 year period of performance; 3 year period of performance for doctoral level (usable for 4 years)
- Eligibility:
  - Must attend a fully-accredited U.S. college or university
  - Must be a citizen of U.S. or its territories, or be lawfully admitted to the U.S. for permanent residence
- EPA-F2009-STARI1 – Green Engineering/Building/Chemistry/Materials
  - Interests in and investigations on the social science and economics of sustainability, pollution, prevention, waste reduction, green engineering, green chemistry, green materials, recycling, and resource conservation; green buildings
- There are several other areas of interest, more related to the environment; please see RFA for those areas
  - Applicants must identify a single topic and FON

## **Smart Grid Investment Grant Program**

FOA # DE-FOA-0000058

- Letter of intent due date (required for each phase in which an applicant intends to submit an application) and application due date:
  - ~~Phase 1: July 16, August 6~~
  - Phase 2: October 23, November 4
  - Phase 3: February 10, March 3
- Funding
  - \$3.4 billion expected to be available
  - 2 categories to be funded:
    - Smaller projects in which the federal share is in the \$300,000 to \$20 million range (40% of SGIG funding)
    - Larger projects in which federal share is in the \$20 million to \$200 million range (60% of SGIG funding)
  - Minimum 50% cost share required
- 3 year period of performance
  - DOE expects to complete award of projects by September 30, 2010 and to make awards in October 2009, March 2010, and June 2010
  - Costs of awards must be invoiced and paid by September 30, 2015
- Eligible applicants
  - Electric power companies (investor-owned utilities, municipal utilities, public utility districts, electric cooperatives, regional organizations such as independent system operators, transmission organizations, and national-level utility organizations), state, county, local, or municipal government agencies, universities and colleges, electricity consumers singly or aggregated together (residential, commercial, industrial, and agricultural customer classes), appliance manufacturers, electrical equipment manufacturers, software providers, and commercial and information services providers, and other private companies (retail electricity suppliers, energy services companies, independent power producers, demand response services providers, metering services providers, project developers, electricity marketers, consultants)
  - Federal agencies, including power marketing administrations, TVA, and USPS are eligible in supporting roles only
  - DOE's national laboratories and FFRDCs are ineligible

- Purpose of program: to accelerate the modernization of the nation's electric transmission and distribution systems, and to promote investment in smart grid technologies, tools, and techniques which increase flexibility, functionality, interoperability, cyber-security, situational awareness, and operational efficiency; to enable measurable improvements from accelerated achievement of a modernized electric transmission and distribution system, including:
  - Reliability of the electric power system
  - Electric power system costs and peak demand
  - Consumer electricity costs, bills, and environmental impacts
  - Clean energy development and greenhouse gases
  - Economic opportunities and new jobs
- Topic areas:
  - Equipment manufacturing
  - Customer systems
  - Advanced metering infrastructure
  - Electric distribution systems
  - Electric transmission systems
  - Integrated and/or crosscutting systems
- Eligible projects are required to support or advance one or more of the smart grid functions as listed in EISA Section 1306 (d)
- For eligible investments for SGIG funds, see EISA, Section 1306 (b)
- For non-eligible investments, see EISA, Section 1306 (c)
- Visit <http://www.fedconnect.net/> for additional information

### **Small Business Technology Transfer Program Phase I Solicitation FY 2010 (STTR)**

- Proposal due: November 17, 2009
- See <http://www.nsf.gov/pubs/2009/nsf09605/nsf09605.pdf> for additional information
- 35 estimated awards, pending availability
- Proposals may be submitted for funding of up to \$150,000
- Cost share not required
- 1 year period of performance
- Eligible applicants: U.S. commercial organizations, especially small businesses with capabilities in scientific or engineering research or education
- The primary objective of the STTR Program is to increase the incentive and opportunity for small firms to undertake cutting edge, high risk, high quality scientific, engineering, or science and engineering education research that would have a high potential economic payoff if the research is successful.
- STTR requires researchers at universities and other research institutions to play a significant intellectual role in the conduct of each STTR project. University researchers should join forces with a small company to spin off their commercially-promising ideas while they remain primarily employed at the research institution.
- Proposers will conduct research and development (R&D) on projects that:
  - Provide evidence of a commercially viable product, process, device, or system, and
  - Meet an important social or economic need

## **Annual Phase I Small Business Innovation Research (SBIR) Small Business Technology Transfer (STTR)**

- FOA #: DE-FOA-0000161
- Application due November 20, 2009
- See <http://www.fedconnect.net/> for additional information
- Objectives of programs: To increase private sector commercialization of technology developed through DOE-supported research and development (R&D), stimulating technological innovation in the private sector, and improving the return on investment from federally-funded research for economic and social benefits to the nation
- Difference between SBIR & STTR: STTR grants must involve substantial cooperative research collaboration between the small business and a single research institution
- Applicants: Only U.S. small business concerns (SBCs); joint ventures may apply, provided entity also qualifies as a small business. See FOA for definitions of SBCs.
- \$36 million expected to be available for Phase I awards
  - \$100,000 ceiling, no floor
  - 360 expected awards
- 9 month period of performance, with start date in June 2010
- Cost share not required, but permitted
- Research or R&D must be performed in U.S.
  
- *Phase I*
  - Grants in FY 2010 for small businesses, up to \$100,000
  - Program to evaluate the scientific or technical merit and feasibility of ideas that appear to have commercial potential and/or substantial applications in support of DOE mission research facilities
  - Success in Phase I is prerequisite to Phase II support
  
- *Phase II*
  - Principal R&D effort
  - Only previous Phase I grantees are eligible
  - Grants up to \$750,000
  
- *Phase III*
  - Non-SBIR capital to be used by small business to pursue commercial applications of the R&D

### **Support of Advanced Coal Research at U.S. Colleges & Universities**

- Application due November 24, 2009
- DE-FOA-0000146
- Visit <http://www.fedconnect.net/> for additional information
- Research limited to:
  - Computational Energy Science
  - Material Science
  - Novel Materials for Sensing or Monitoring in Extreme Environments of Fossil Energy Systems
- \$2.04 million expected to be available for 6-7 awards
- \$300,000 ceiling
- 36 month period of performance

## **ARRA – Workforce Training for the Electric Power Sector**

- Funding Opportunity Announcement (FOA) #: DE-FOA-0000152
- Application due November 30, 2009
- Total of \$100 million expected to be available
- Eligible applicants: all domestic entities, except for other federal agencies, Federally Funded Research & Development Center Contractors, and non-profit organizations as described in section 501(c)(4) of the Internal Revenue Code of 1986 that engaged in lobbying activities after December 31, 1995.
- Up to three year period of performance
- See <http://www.fedconnect.net/> for additional information
- Objective: to facilitate the development of a well-trained, highly-skilled electric power sector workforce
  
- *Topic A: Developing and Enhancing Workforce Training Programs for the Electric Power Sector*
  - Develop new training programs for the electric power sector, with the focus on achieving a national, clean-energy smart grid
  - Includes the entire electricity delivery system (transmission & distribution), and related electrical equipment manufacturing
  - Applicant must:
    - Identify skills deficiencies that will be addressed
    - Demonstrate familiarity with the electric power system and needed skills sets
    - Be able to support specialized training
    - Demonstrate the ability to/discuss approach/plan to:
      - Establish and maintain strong partnerships with electric power companies and/or smart grid technology manufacturers and demonstrate how these partnerships will enhance national training efforts
      - Enhance transportability of credentials geographically and within all segments of the industry
      - Expand training capacity
      - Build awareness about training programs and smart grid careers
      - Maintain effective relationships with state agencies, local communities, and other stakeholders to help shape future training partnerships
  - Up to \$750,000 (federal share) per award
  - 25-35 awards total, including subtopic award
  - 20% cost share required, except for academic institutions (no less than 10% cost share required)

- *Subtopic (within Topic A): Strategic Training & Education in Power Systems (STEPS)*
  - Applications for STEPS to be evaluated separately from Topic A
  - Objective: to support educators at universities and colleges in developing new curriculum and training activities related to the achievement of the next-generation electric power workforce with solid technical understanding and innovativeness to address energy challenges
  - Applications may include the development of certificate programs for training technicians and teachers in science, technology, engineering, and math, with focus on electric power systems
  - Up to \$2.5 million (federal share) per award
  - 8-10 awards expected
  - 20% cost share, except for academic institutions (no less than 10% cost share accepted)
  
- *Topic B: Smart Grid Workforce Training*
  - To provide training for electric power sector personnel, including electricity delivery system (transmission & distribution) and related electrical equipment manufacturing
  - Individuals eligible for training include workers that:
    - Increase workforce capacity and capability of electric power companies and smart grid technology manufacturers to implement ARRA electricity-related activities
    - Address skills shortages in the power sector, especially in the area of transmission planners, system operators, utility energy efficiency staff, lineworkers, electricians, and technicians
    - Need updated training to support a national clean-energy smart grid
  - Applications should include commitment letters from electric power companies, labor organizations with qualified apprenticeship programs, and/or smart grid technology manufacturers
  - Up to \$5 million (federal share) per award
  - 15-20 awards expected
  - 50% cost share



### **CHE-DMR-DMS Solar Energy Initiative**

- Preliminary proposal due December 8, 2009
- Full proposal due March 10, 2010
- See <http://www.nsf.gov/pubs/2009/nsf09604/nsf09604.pdf> for additional information
- 3-10 expected awards at \$500,000/year; anticipated total funding for program is \$7 million
- Cost sharing not required
- Purpose: to support interdisciplinary efforts by groups of researchers to address the scientific challenges of highly efficient harvesting, conversion, and storage of solar energy
- Research will investigate novel methods for solar energy harvesting and conversion with potential efficiency substantially beyond the current technology
- Eligible applicants: universities or two- or four-year colleges accredited in and having a campus in the U.S., acting on behalf of faculty members
  - There must be 3+ co-principal investigators: 1 researcher in chemistry, 1 researcher in materials, and 1 researcher in mathematical sciences
- Applicants should ensure the project doesn't overlap other ongoing federally-funded research projects

## **Smart Way Clean Diesel Finance Program FY 2009/2010 Request for Proposals (RFP)**

- RFP closes December 8, 2009
- Visit [http://www.epa.gov/air/grants/final\\_smartway\\_rfp\\_10-9-09.pdf](http://www.epa.gov/air/grants/final_smartway_rfp_10-9-09.pdf)
- RFP # EPA-OAR-OTAQ-09-13
- RFP seeks proposals for projects that reduce diesel emissions through the creation of national, tribal, regional, state, or local finance programs
- Finance programs include those that provide the loan recipient with a specific financial incentive to purchase or lease eligible retrofitted vehicles or equipment (loan guarantees, issuance of tax-exempt or tax bonds for low cost loans, revolving loans, or leases)
- Eligible diesel emission reductions include verified emission control technologies such as retrofit devices, cleaner fuels, and engine upgrades; verified idle reduction technologies; verified aerodynamic technologies; low rolling resistance tires; certified engine repowers &/or vehicle or equipment replacement
- Eligible diesel vehicles, engines, and equipment include buses; medium or heavy duty trucks; marine engines; locomotives or non-road engines; equipment or vehicles used in construction, handling of cargo (port or airport included), agriculture, mining, or energy production (including stationary generators or pumps)
- Eligible entities: regional, state, local, or tribal agencies or port authorities with jurisdiction over transportation or air quality, and non-profits that represent or provide pollution reduction or educational services to persons or organizations that own or operate diesel fleets or have, as their principal purpose, the promotion of transportation or air quality
- EPA will consider funding finance programs that involve:
  - Verified retrofit technologies – up to 100% of cost of eligible exhaust controls and engine upgrades
  - Verified/certified cleaner fuel use – the cost differential between the eligible cleaner fuels and conventional diesel fuels
  - Verified idle reduction technologies – up to 100% of the cost
  - Verified aerodynamic technologies and low rolling resistance tires – up to 100%
  - Certified engine repower – up to 100%
  - Certified vehicle/equipment replacement
    - Up to 100% of the cost of pre-2007 used vehicle or equipment retrofitted with the verified emission control technology
    - Up to 100% of the cost of newer, cleaner (MY2007 or newer) vehicle or equipment with the verified emission control technology or certified engine configuration (replacement and scrappage conditions apply to the financing of new vehicles, engines, and equipment)
  - School bus replacement – up to 100% of the cost of buses that meet at least EPA's 2007 emissions levels for heavy-duty highway vehicles (replacement and scrappage conditions apply to financing of new school buses)

- EPA will evaluate on the following areas:
  - Health benefits
  - Cost-effectiveness
  - Serve areas:
    - With high population density
    - With poor air quality
    - That receive a disproportionate quantity of air pollution from diesel fleets, including truck stops, ports, rail yards, terminals, and distribution centers
    - That use community-based multi-stakeholder collaborative process to reduce toxic emissions
  - Include a certified engine configuration or verified technology that has a long-expected useful life
  - That maximize the useful life of any certified engine configuration or verified technology used or funded by the eligible entity
  - Conserve diesel fuel
  - Utilize ultra low sulfur diesel fuel ahead of EPA's mandate
- \$12 million expected available, to be distributed in 1-6 cooperative agreements ranging from \$2 million - \$12 million

## **Clean Diesel Emerging Technologies Funding Assistance Program, FY 2009/2010**

### **RFP**

- RFP closes December 8, 2009
- Visit [http://www.epa.gov/air/grants/emergtech\\_10\\_14\\_09.pdf](http://www.epa.gov/air/grants/emergtech_10_14_09.pdf) for more information
- RFP # EPA-OAR-OTAP-09-12
- RFP due December 8, 2009
- Proposals for projects that achieve significant reductions in diesel emissions in terms of tons of pollution produced and diesel emissions exposure, especially in areas designated as poor air quality areas
- Only eligible diesel reduction solutions that may be proposed are the use of emerging emission control technologies as listed on the National Clean Diesel Campaign's Emerging Technologies list (<http://www.epa.gov/otap/diesel/prgemerglist.com>)
- Eligible diesel vehicles, engines, and equipment includes buses, medium- or heavy-duty trucks, marine engines, locomotives, and non-road engines, equipment, or vehicles used in construction, handling of cargo (port or airport), agriculture, mining, or energy production (including stationary generators and pumps)
- Eligible entities: regional, state, local, or tribal agencies or port authorities with jurisdiction over transportation or air quality, and non-profit organizations that represent or provide pollution reduction or educational services to persons or organizations that own or operate diesel fleets or have, as their principal purpose, the promotion of transportation or air quality
- \$8 million expected to be available for 6-10 cooperative agreements ranging from \$500,000 to \$1.5 million

## **National Clean Diesel Funding Assistance Program FY 2009/2010 RFP**

- RFP closes December 8, 2009
- Visit [http://www.epa.gov/air/grants/2009\\_10\\_6\\_final-dera.pdf](http://www.epa.gov/air/grants/2009_10_6_final-dera.pdf) for additional information
- RFP # EPA-OAR-OTAP-09-10
- Proposals sought for projects that achieve significant reductions in diesel emissions in terms of tons of pollution produced and diesel emissions exposure, particularly from fleets operating in areas designated as poor air quality areas
- Eligible diesel emission reduction solutions: verified emission control technologies such as retrofit devices, cleaner fuels, and engine upgrades, verified idle reduction technologies, verified aerodynamic technologies and low rolling resistance tires, certified engine repowers, and/or vehicle or equipment replacement
- Eligible diesel vehicles, engines, and equipment include: buses, medium- or heavy-duty trucks, marine engines, locomotives and non-road engines, and equipment or vehicles used in construction, handling or cargo (at port or airport), agriculture, mining, or energy production (including stationary generators and pumps)
- Eligible entities include regional, state, local, tribal agencies, or port authorities with jurisdiction over transportation and/or air quality, and non-profit organizations that represent or provide pollution reduction or educational services to persons or organizations that own or operate diesel fleets or have, as their principal purpose, the promotion of transportation or air quality
- Total funding estimated at \$64 million
- EPA will fund:
  - Verified retrofit technologies – up to 100% of the cost of eligible exhaust controls and engine upgrades
  - Verified/certified cleaner fuel use – cost differential between the eligible cleaner fuels and conventional diesel fuels
  - Verified idle reduction technologies – up to 100%
  - Verified aerodynamic technologies and low rolling resistance tires – up to 100%
  - Certified engine repower – up to 75% of cost (labor & equipment)
  - Certified vehicle equipment replacement – incremental cost of a newer, cleaner vehicle or piece of equipment, up to 25% of the cost of eligible replacement vehicle or piece of equipment (excludes school buses)
  - School bus replacement
    - For replacements that meet EPA's 2010 emission levels for heavy-duty highway vehicles, the incremental cost of a newer, cleaner school bus, up to 50% of the cost of an eligible replacement school bus
    - For replacement buses that meet EPA's 2007 emissions levels for heavy duty highway vehicle, the incremental cost of a newer, cleaner school bus up to 25% of the cost of an eligible replacement school bus
- No funds awarded shall be used to fund the cost of emission reductions mandated under federal, state, tribal, or local law

- Single proposal may target multiple fleets, fleet types, and/or diesel emission reduction solutions
- Entities in Indiana are eligible to request funding between \$250,000 to \$1.5 million

## **7<sup>th</sup> Annual P3 Awards: A National Student Design Competition for Sustainability Focusing on People, Prosperity, and the Planet**

- Application due: January 4, 2010
- See <http://www.epa.gov/P3/> or <http://www.grants.gov/> for additional information
- 40 awards expected for Phase 1; 6 awards expected for Phase 2
- \$850,000 available for all awards
- Up to \$10,000 available per Phase 1 grant
- Can apply for Phase 2 funding upon successful completion of Phase 1 for up to \$75,000 for 2 more years
- Eligible applicants: Public non-profit and private non-profit institutions, limited to degree-granting institutions of higher education located in U.S.
  - Partnerships with industry or nongovernmental agencies are strongly encouraged
  - Students on teams must be enrolled in the institution
  - Eligible non-profits also include research institutions, corporations, or foundations that are part of a U.S. institution of higher education
  - Interdisciplinary teams, including representatives from multiple engineering departments and/or departments of chemistry, architecture, industrial design, business, economics, policy, or social science are strongly encouraged
- Purpose: to research, develop, and design solutions to real world challenges involving the overall sustainability of human society
- P3 program will generate research outputs in the form of innovative, inherently benign, integrated, and interdisciplinary designs that will advanced the scientific, technical, and policy knowledge necessary to further the goals of sustainability
- Desired outcomes: to maintain or improve human health, advance economic competitiveness, and protect and preserve the environment by effectively and efficiently using water, materials, and energy, and minimizing the generation, emission, and use of hazardous substances
- Phase 1 research areas for students:
  - Identify the technical challenge to sustainability that their design will address
  - Discuss how the identified technical challenge relates to people, prosperity, and the planet
  - Propose a scientifically-based design approach to address the challenge
  - Propose an approach to communicate relevant data and info to users and stakeholders
- Projects must be science-based research or development
- See FOA for research plan requirements
- Must address 1 or more research areas:

- *Energy – FOA #: EPA-G2010-P3-Q1*
  - Reduction in air and water emissions through innovative strategies for energy production and energy distribution; energy conservation; inherently benign energy through green chemistry, green engineering
- *Built Environment – FOA # EPA-G2010-P3-Q2*
  - Green building designs; transportation and mobility strategies; smart growth approaches that result in environmental benefits such as air emission reductions or water quality improvements
- *Materials & Chemicals – FOA # EPA-G2010-P3-Q3*
  - Materials conservation; renewable feedstock; materials and chemicals that are inherently benign; energy-, water- and material-efficient through their full life cycles; recovery and reuse of materials through product, process, or system design
- *Agriculture – FOA # EPA-G2010-P3-Q5*
  - Productive use of agricultural wastes